

Remarks

Claims 1, 4-17, 19-20, 24-26, 28-32 and 34-37 are pending.

Applicants acknowledge with appreciation the Examiner's indication that claims 4, 5, 8, 9 and 11-14 are free of the prior art and would be allowable if rewritten in independent form.

Summary of Amendments

The specification is amended herein to correct clerical errors pointed out by the Examiner. Additionally, the specification has been amended to replace "pyridylC₁₋₂alkyl, imidazolylC₁₋₂alkyl" with the recitation: "4-pyridylmethyl, 4-pyridylethyl, 4-imidazolylethyl". Support for this amendment can be found in Applicant's original specification, particularly at page 10, lines 20-25, page 11, line 6, Example Ib-5 at page 51, Example Ib-6 at page 51, and Example Ib-8 at page 52. No new matter is added.

Claim 1 is amended to replace "pyridylC₁₋₂alkyl, imidazolylC₁₋₂alkyl" with the recitation: "4-pyridylmethyl, 4-pyridylethyl, 4-imidazolylethyl" and to remove the recitation: "(1) R⁴ is H, a C_{1-C₄} alkyl, or a dialkylaminoalkyl and R⁵ and R⁶ together represent a single oxygen or S atom which is linked to the diazepine ring by a double bond and p is zero or 1; or". No new matter is added.

Claims 1, 4 and 5 are amended to change plural to singular. No new matter is added.

Claims 4-9 are amended to place the claims in independent form. No new matter is added.

Claims 24-25 are amended to recite "a mammal in need thereof." No new matter is added.

Claims 28-30 are amended to change singular to plural. No new matter is added.

Claim 37 is amended to delete "1)". No new matter is added.

Improper Markush Rejection Overcome

Currently claims 1, 24 and 32 are rejected as drawn to an improper Markush group. The Office Action states that the compounds, while possessing a common utility, differ widely in structure and are not art-recognized equivalents. Specifically, the Office Action states that the variables R⁴, R⁵ and R⁶ have variably different definitions, rendering the claims clearly improper.

Applicants have amended claim 1 to narrow the definition of variables R⁴, R⁵ and R⁶. To the extent that the Examiner maintains the rejection in light of the foregoing amendment, Applicants respectfully traverse the rejection.

Where a Markush expression is applied only to a portion of a chemical compound, the propriety of the grouping is determined by consideration of the compound as a whole, and does not depend on there being a community of properties in the members of the Markush expression. MPEP 2173.05(h). In the instant case, the compound as a whole represents a common core around which variables R⁴, R⁵ and R⁶ may vary. While Applicants acknowledge that the various members defining the variables R⁴, R⁵ and R⁶ are not members of an art-recognized class, the compounds as a whole share a common structural feature, namely the benzodiazepine ring structure, disclosed as essential to the disclosed utility of the compounds. Accordingly, the rejection based on improper Markush group should be withdrawn. See, *Ex Parte Raghavan Rajagopalan et al.*, Application Serial No. 07/627,175, Appeal No. 94-2280, USPTO Bd Pat Appeals and Interferences (the Examiner's rejection for improper Markush group was reversed by the Board where the compounds as a whole possessed a common structural feature essential to the disclosed utility).

Objections to the Specification Overcome

It is respectfully submitted that the outstanding objections to the specification are overcome by the foregoing amendments thereto. Specifically, the paragraph on page 5, line 22 and continuing to page 6, line 9 is amended to add "is"; the paragraph beginning on page 6, line 25 and continuing to page 7, line 9 is amended to add "then"; and the paragraph on page 3, lines 5-25 is amended to replace "pyridylC₁-

"alkyl, imidazolyC₁₋₂alkyl" with the recitation: "4-pyridylmethyl, 4-pyridylethyl, 4-imidazolylethyl".

Section 112, First Paragraph Rejections Overcome

Claims 1, 10, 24, 25 and 32 currently stand rejected under 35 U.S.C. section 112, first paragraph, the Office Action stating that the claims contain subject matter that was not described in the specification. Applicants respectfully submit that the foregoing amendment to claim 1 replacing "pyridylC₁₋₂alkyl, imidazolyC₁₋₂alkyl" with the recitation: "4-pyridylmethyl, 4-pyridylethyl, 4-imidazolylethyl" overcomes this rejection.

Section 112, Second Paragraph Rejections Overcome

The section 112, second paragraph rejections are addressed in the same order as they appear in the Office Action.

- a) and b) Claim 3 currently stands rejected under 35 U.S.C. section 112, paragraph 2. Applicants respectfully submit that the rejections of claim 3 are moot in view of the cancellation of that claim. Withdrawal of these rejections is therefore respectfully requested.
- c) and d) Claim 6 currently stands rejected for the , the inclusion of "2" in the definition of m, the Office Action stating that the recitation lacks antecedent basis. Applicants respectfully submit that the foregoing amendment placing claim 6 in independent form overcomes this rejection. Withdrawal of this rejection is therefore respectfully requested.
- e) Claim 7 currently stands rejected for the , the inclusion of "2" in the definition of m, the Office Action stating that the recitation lacks antecedent basis. Applicants respectfully submit that the foregoing amendment placing claim 7 in independent form overcomes this rejection. Withdrawal of this rejection is therefore respectfully requested.

f) Claims 24 and 25 currently stand rejected the Office Action stating that the claims are unclear as to whether this is indicative of a subject in need thereof. Applicants respectfully submit that the foregoing amendment to claims 24–25, adding "in need thereof" after "mammal", overcomes this rejection. Withdrawal of this rejection is therefore respectfully requested.

g) Claims 28 and 29 currently stand rejected, the Office Action stating that the claims are vague and indefinite in that the species are not stated as a Markush group. The Examiner has requested that the claims be amended to depend from claim 1 or recite formula (I). Applicants respectfully traverse this rejection.

Applicants are fully entitled to claim these specific compounds in the form of an independent claim. Section 112, second paragraph does not require Applicants to claim species as dependent claims. That the claims recite only one species does not, in any way render the claims vague and indefinite.

The standard for review pursuant to section 112, second paragraph is whether one skilled in the art would understand the metes and bounds of the claims. By specifically claiming a compound by its *chemical name*, there can be no doubt that one skilled in the art understands the metes and bounds of the claim. Accordingly, it is respectfully submitted that the claim is in compliance with section 112, second paragraph and withdrawal of this rejection is respectfully requested.

Section 102(b) Rejections Overcome

Claims 1-3, 24, 32 and 33 currently stand rejected under 35 U.S.C. § 102(a) or 102(b), the Office Action stating that the various claims are anticipated by the cited references. Applicants respectfully submit that the amendment to claim 1, removing the recitation of "(1) R⁴ is H, a C₁-C₄ alkyl, or a dialkylaminoalkyl and R⁵ and R⁶ together represent a single oxygen or S atom which is linked to the diazepine ring by a double bond and p is zero or 1; or" and the cancellation of claims 2-3 and 33 overcomes all of these rejections. Accordingly, withdrawal of these rejections is respectfully requested.

Applicants respectfully submit that the instant application is in condition for allowance, which action is respectfully requested. The Examiner is invited to contact the undersigned at (919) 483-8222 to discuss this case further, if desired.

Respectfully submitted,



Lorie Ann Morgan, Esq.
Reg. No. 38,181

GlaxoSmithKline, Inc.
Corporate Intellectual Property
Five Moore Drive
P.O. Box 13398
Research Triangle Park, NC 27709
phone: 919 483-8222
fax: 919 483-7988